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ABSTRACT OF THE DISCLOSURE

A circuit is provided to drive LEDs or diode lasers that emit light in desired wavelengths, such as the primary colors red, green, and blue, which serve as the light source for a projection display system. A display controller controls one or more series-parallel arrays of each color LED in the LED circuit with control signals to synchronize the color output of the light source with image data received from an image data source such as a personal computer. Synchronization is achieved by sending control signals to the power supply and circuit switches to sequence the color output in a single path system or adjust continuous color output in a triple path system with minimal or no reductions in the brightness of the projected image.